

## **Federal Glass Co.**

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Although the Federal Glass Co. was primarily a manufacturer of tableware – especially tumblers – the plant still made some marked jars. The history is rich in detail, but most of it is less relevant to our study of containers. We have concentrated on Federal’s marked jars.

### **Histories**

#### **Early Beatty Family Glass Houses (1845-1899)**

The Beatty family had a long history in the glass business, harkening back to 1845, when their father, Joseph Beatty, joined with Edward Stillman in the purchase of a small glass house on Fourth St. near Market at Steubenville, Ohio. Although Joseph’s brother, Alexander J. Beatty, took over, the glass house remained in the Beatty family until 1887 (Iwen 2006:13).<sup>1</sup>

Alexander J. Beatty & Sons accepted a \$50,000 offer in cash and land from the town of Tiffin, Ohio, to relocate their tableware plant in 1887. The \$65,000 factory produced its first glass in 1889 at three furnaces, each with 15 pots. The plant made tumblers and tableware in several colors, including opal (milk) glass. The firm was part of the merger that created the U.S. Glass Co. in 1892 (Iwen 2006:13-14).

The Beatty brothers – George Beatty and Robert James Beatty – moved to Dunkirk, Indiana, when Tiffin’s natural gas supply was mostly exhausted in 1896, where they were joined by Charles Neave Brady. The factory made tumblers, tableware, packers’ goods, and fruit jars. The group again participated in a merger, this time to form the National Glass Co. in October 1899. In 1900, the group sold the factory to the combine (Iwen 2006:14).

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<sup>1</sup> Since information on tableware factories – such as these – are beyond the scope of this work, our information on them is minimal. See Welker & Welker 1985 or online sources for more on tableware.

## Federal Glass Co., Columbus, Ohio (1900-1958)<sup>2</sup>

In 1900, George Beatty, Robert J. Beatty, Charles N. Brady, James Kuntz, Jr., John W. Donnan, and H.M. Hussel chartered the Federal Glass Co. as a West Virginia corporation. The group elected Kuntz president in fulfillment of a West Virginia possible law that a lawyer from that state had to be president.<sup>3</sup> The initial capital stock was \$175,000, but the directors soon raised it to \$275,000 to cover the purchase of new equipment and the expansion of the plant. The firm broke ground for its new factory at Columbus, Ohio, on June 1, 1900 (Iwen 2006:14). Beatty had plans for the new factory drawn up by at least May 9 (Roller 1998).

The plant operated a single continuous tank in 1901, added another in 1902, and followed with a third in 1904. The No. 2 tank was generally devoted to fruit jar production. The plant made pressed and blown tableware, tumblers, bottles, and jars at the three tanks with 36 rings. Federal re-chartered in Ohio on May 28, 1904, and purchased the earlier corporation for \$245,000. Incorporators this time were Beatty brothers, James S. Brackett, George T. Everett, and George W. Davis. The new capital was \$250,000 (Iwen 2006:14-15; Lehner 1978:36; Roller 1998; Toulouse 1971:192; Welker & Welker 1985:52-53).

The Thomas Registers listed the company as making jars from 1907 to 1909 but did not list the specific type (1907-1908:799; 1909:1101). An advertisement for “The Federal Jar,” however, appeared at least as early as 1907. The Federal Glass Co. ad showed an

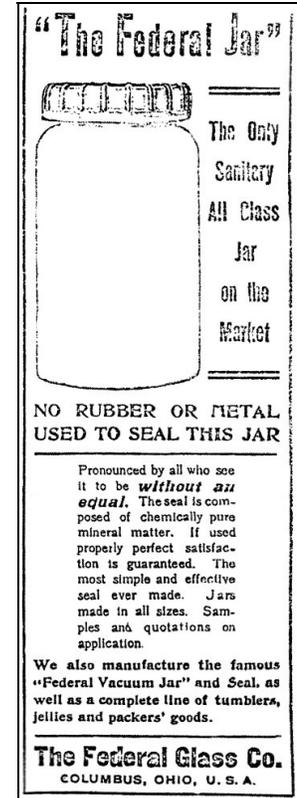


Figure 1 – 1907 Federal Jar ad (Iwen 2006:17)

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<sup>2</sup> For a thorough history with many family and personal recollections of “The Federal,” see Iwen (2006).

<sup>3</sup> Although Iwen (2006:14) claimed that Kuntz was president because of a state law, in the next paragraph, she stated that the firm’s “first officers included George Beatty, president; James S. Bracken, vicepresident [*sic*]; William C. Bracken, secretary; and James Kuntz, Jr., treasurer.” This *could* have been the lineup for the second corporation. It was not unusual for glass firms to incorporate in one state while building a factory in another – especially if most of the officers lived in the state of incorporation.

unembossed jar with a glass lid and bragged that the Federal was “the only sanitary all glass jar on the market” (Figure 1).

Federal experimented with the Brooke feeder on semiautomatic machines at least as early as 1910. At some point, James M. Beatty and two other employees, Oliver M. Tucker and William A. Reeves, experimented with their own style of gob feeder for use in the production of pressed tumblers, jelly glasses, fruit jars, and packers’ ware. The plant began using semiautomatic Miller press machines in 1912, although some products continued to be produced by hand methods (Iwen 2006:17, 19).<sup>4</sup>

Also, in 1912 (the first year individual jar types were listed), the Thomas Register showed Federal as specifically making fruit jars, and a listing under kitchen cabinet jars began in 1916. The listings ran until 1920, but the company was no longer enumerated as making jars in 1921 (1912:2727; 1916:3783; 1917:1104-4105; 1918:4430-4461; 1920:4616-4617). At some point, Federal commissioned a brass paperweight, undoubtedly as an advertisement (Figure 2).



Figure 2 – Federal paperweight

The *Journal of Industrial and Engineering Chemistry* (1913:953) confirmed that the plant made “packers’ and preservers” bottles as well as fruit jars entirely by semiautomatic machines in 1913. According to Toulouse (1971:192), Federal began to concentrate on tableware by 1918. Iwen (2006:23) noted that Federal “discontinued fruit jar manufacturing sometime during the late 1920s or early 1930s. However, the plant continued to make packers’ ware at least into the 1960s.”<sup>5</sup>

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<sup>4</sup> Automatic feeders like the Brooke turned semiautomatic glass machines into fully automatic ones. Presses forced glass into molds. This was initially accomplished by human pressure on long handles, although Miller and other inventors eventually adapted mechanical power to the operation.

<sup>5</sup> Toulouse (1971:192), however, claimed that packer jars were discontinued by 1925, although the plant continued to produce packer tumblers.

Federal leased its first Hartford-Empire machine in 1927 (Iwen 2006:19) and, by that year, the conversion to tableware was apparently complete.<sup>6</sup> The Glass Factory Yearbook at that time only listed Federal in the tableware section as making “pressed jellies, tumblers, packers’ tumblers, machine blown and pressed tumblers and stemware, as well as “Decorated stemware” – all at four continuous tanks with 64 rings. Federal was listed in the “Bottle and Containers Manufacturers” section in 1931 as making packer’s tumblers, and that listing continued until at least 1944 (*American Glass Review* 1927:91; 1931:82; 1944:100).

By 1940, Federal had replaced all its machines with those from Hartford-Empire. The following year, in June, the plant was unionized for the first time. Even though Federal experienced record-breaking profits in 1945, strikes forced the plant to shut down one continuous tank in 1946, and foreign competition necessitated the closing of the remaining hand shops during the same year, and the plant became completely automatic. On June 30, 1958, the firm became the Federal Glassware Division of Federal Paper Board Co., Inc. (Iwen 2006:19, 22-25; Toulouse 1971:192-193; Welker & Welker 1985:52-53).

By the early 1970s, 40% of Federal’s business involved making tumblers for major oil companies. During the late 1960s and early 1970s, many gas stations offered free tumblers and similar items with each fill-up at their stations. The 1973 OPEC oil embargo ended the free promotional items and severely damaged Federal’s profits. Beginning in 1977, the Federal Paper Board Co. began its attempts to sell the glass division, but its efforts failed. General Manager Jack E. Spengeler announced the discontinuation of glass manufacture on January 31, 1979, and the plant closed forever on April 1 (Iwen 2006:26-27).

## **Containers and Marks**

### **F in a Shield (1932-1958)**

The Federal Glass Co. obtained a trade mark for the F-in-a-shield logo on December 6, 1944, claiming a first use on August 1, 1932. The mark, however, had appeared in company

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<sup>6</sup> Hartford-Empire was one of the early major competitors of the Owens machines. See our article in the machine section of the Historic Bottle Webpage (Lindsey 2015).

catalogs by at least 1927. John C. Peters, a Federal sales representative, suggested the logo as a manufacturer's mark for fruit jars, although the patent stated that the mark was to be used on "glass tumblers, glass tableware, and glass kitchenware not including glass bottles and jars." Not surprisingly, collectors have found no jars with the Shield F mark (Iwen 2006:23).

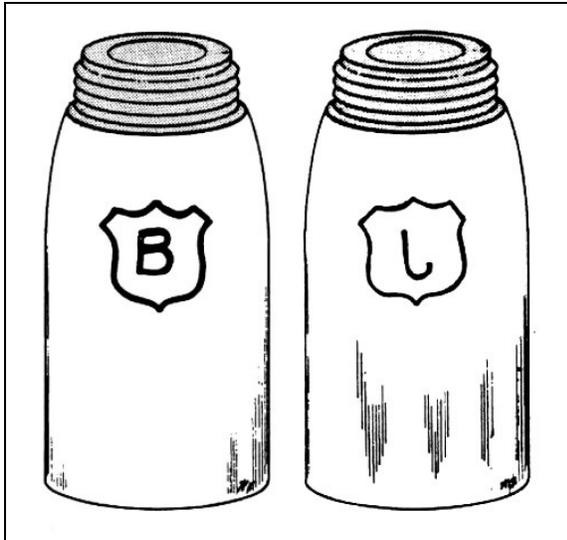


Figure 4 – Other shield jars (Creswick 1987a:134, 136)

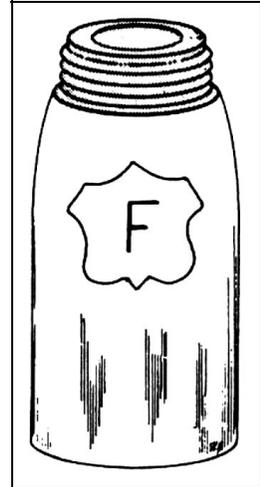


Figure 3 – Shield-F jar (Creswick 1987a:135)

Creswick (1987a:135) illustrated a Mason jar an F-in-a-shield mark embossed on one side (Figure 3). Aside from noting that the jar was

colorless, she made no attempt to trace the maker or dates. However, these jars were mouth blown and used the Mason shoulder seal. They are thus too early for the logo – *not* adopted until 1932 – to have been from Federal Glass. Creswick (1987a:134-137) also showed or described other jars of the same style embossed with shields bearing initials A, B, D, E, F, J, K, W, X, and Y

as well as with numbers 2 and 4 (Figure 4). These are almost certainly not manufacturer's marks and should not be confused with the later Shield-F logo used by the Federal Glass Co. on non-container items. Even though Federal Glass certainly made Mason jars, there is no evidence that these were embossed with any markings identifying the manufacturer. The maker remains unknown.

### **FGCo monogram** (ca. 1900-late 1920s)

Toulouse (1969:282) described a mouth-blown jar sealed with a "Lightning closure, old-style neck design" that was embossed on the front face with a triangle. Inside the border of the triangle was "SECU / RITY / SEAL" following the three sides. In the center was the FGCo monogram (Figures 5 & 6). He speculated that the Fairmount Glass Co. may have made the jar.



Figure 5 – Security Seal (eBay)

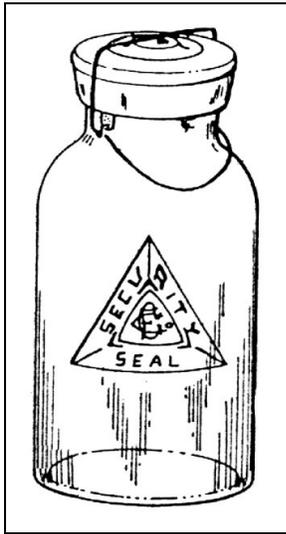


Figure 7 – Security Seal (Creswick 1987b:122)

Roller (1983:325) listed the jar and stated that the maker was uncertain but could have been Fairmount Glass Co. Creswick (1987b:122) illustrated a lightning-seal jar embossed with a triangle and suggested that the Fairmount Glass Works, Fairmount and Indianapolis, Indiana, made the jar during the 1898-1945 period (Figure 7). She also stated that the jar was made in both regular and wide-mouth styles. Although she remarked, “See the trademark pages for a trademark issued in 1934 to this company,” the trademark page (Creswick 1987b:155) only showed the Hexagon-F mark. The Roller update (2011:471) added that the Fairmount Glass ascription could not be verified, so the identification was dropped from the text.

Iwen (2006:23), however, positively identified the Security Seal jar as made by the Federal Glass Co. beginning ca. 1906.

Although Ewen did not explain her reasoning, she has currently done more research on the firm than anyone we have discovered. Presumably, she had good reason for her identification. It is certainly a better choice than the Fairmount Glass Co. – which never existed – or the Fairmount Glass Works, a name that does not fit the initials. An eBay photo showed the glass lid on a Security Seal jar embossed “E-Z / SEAL” (Figure 8). Some of the bases were embossed with single-digit numbers, although others only had the valve scars (Figure 9).

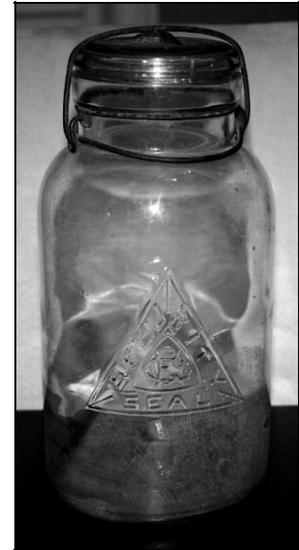


Figure 6 – Security Seal (eBay)



Figure 8 – Security Seal lid (eBay)



Figure 9 – Security Seal base (eBay)

## Diamond Fruit Jar Marks (ca. 1906-ca. 1920)

Toulouse (1969:91-92; 1971:161) illustrated two diamond marks embossed on the bases of machine-made, round fruit jars. Each consisted of words associated with horizontally elongated diamond marks. In one, “DIA” was embossed above the left upper line of the diamond; “MOND” above the right upper line; “TRADE MARK” within the diamond; “FRUIT” below the left lower line; and “JAR” below the right lower line. The other had “DIAMOND” above the left upper line; “FRUIT JAR” above the right upper line; “IMPROVED” in the center; “TRADE” below the left lower line; and “MARK” below the right lower line. In his earlier book, Toulouse dated both jars ca. 1915-1920, but he admitted he did not know the maker. In his second book, he noted that the “Improved” label was probably the earlier one and dated it “probably before 1915” with the second one at “probably after 1915.”

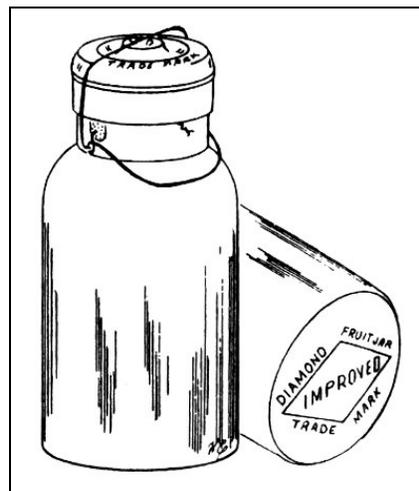


Figure 10 – Diamond Improved (Creswick 1987b:42)

Roller (1983:102; 2011:162) listed the jars and dated them both ca. 1906. He reported that “Frank Smalley has stated that these were the first jars sold by Smalley, Kivlan and Onthank.” He further noted that the Federal Glass Co., Columbus, Ohio, made the jars. Creswick (1987b:42) described the two jars and illustrated one of them (Figure 10). She dated the “Improved” variation ca. 1906 “or later” and the other variation ca. 1915-1920. Creswick also identified the maker of the jars as “Federal Glass Co., Columbus, Ohio for Smalley, Kivlan & Onthank, jobbers,” probably following Roller. Iwen (2006:23) confirmed the identification.

## Other Federal Jars

Toulouse (1969:116) listed a mouth-blown jar embossed “FEDERAL (outlined letters – slight arch) / {image of a partly-furled flag} / FRUIT JAR (with letters descending then ascending in size). The jar was sealed with a “glass lid with old neck design Lightning finish” but he did not know the maker (Figure 11). Roller (1983:123; 2011:191) suggested the Melbourne Glass Bottle Works Co., Ltd. of Melbourne, Australia, as a possible manufacturer.



Figure 11 – Federal Fruit Jar (North American Glass)

Creswick (1987a:59), too, called it an “Australian jar.” The design of the flag had a cross with stars inside the cross (four stars across and four down).

The design on the front does *not* match the Australian flag, which has the Union Jack (Britain) in the corner, a federal star below, and the southern cross in the center. Nor does it match any U.S. flag. It most closely resembles the Confederate flag or the one from Mississippi (based on the Confederate flag) –



Figure 12 – Bushell’s label (North American Glass)

although the “cross” is an “X” shape in the latter two flags. The jar was probably not made by the Federal Glass Co. However, North American Glass included an example with a paper label from Busell’s Pty. Ltd. – an Australian firm – pretty well cementing the Australian identification (Figure 12).

Iwen (2006:23) also noted another jar embossed on the base with “FEDERAL VACUUM JAR PAT. APPLIED FOR WARM CAP PUNCTURE TO OPEN.” We have found no other references to this jar.

## Discussion and Conclusions

The sources universally agreed that Federal made the jars with the diamond logos. The others deserve a bit of discussion. It is equally clear that the Federal Fruit Jar was used in Australian and almost certainly made there – *not* by the Federal Glass Co.

### Shield-F and Diamond Marks

There is no question that the Shield-F mark was trade marked and used by Federal. Both Creswick and Iwen identified Federal as the maker of the Diamond fruit jars, and no researcher has suggested any other company as the manufacturer. Thus, the Shield-F mark should be

associated with the Federal Glass Co. However, by the time Federal used the logo, it had likely ceased jar production. The one jar with a Shield-F side embossing, mentioned by Creswick, was almost certainly *not* made by Federal. There is no reason this logo on any bottles or jars.

## **FGCo Monogram**

Although Iwen identified the monogram mark as being used by Federal, we wanted to test that further. Four companies with the correct initials – Federal Glass Co., Florida Glass Co. (Florida, Indiana), Fostoria Glass Co. and Frank Glass Co. – all made fruit jars. The Frank Glass Co. (1896-1903) and Florida Glass Co., Florida, Indiana (at least 1897-1900) may be eliminated because of the time period the plants were in business (all jars with the FGCo monogram were colorless with continuous-thread finishes). Frank jars were known to be marked with either “ASW” or the company’s full name. The Fostoria Glass Co. is equally unlikely; the plant primarily made tableware, with only one fruit jar addressed in the secondary literature. Thus, the almost certain maker of the jar with the FGCo monogram was the Federal Glass Co.

## **Acknowledgments**

Our gratitude to Doug Leybourne for letting us use the drawings from the Alice Creswick books and Greg Spurgeon for permission to reproduce the photos from *North American Glass*. Thanks also to Wanda Wakkinen for proofreading.

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Last updated 7/8/2015